

What Is Claimed Is:

1. An image forming method for forming a toner image on a recording medium, comprising the steps of:

supporting a latent image on a latent image support;

using toner to develop the latent image on said latent image support;

electrostatically transferring the toner image on said latent image support onto a recording medium; and

bringing a heating member into close contact with the toner image electrostatically transferred onto said recording medium and thereby fixing said toner image to said recording medium,

wherein the estimated average halftone granularity of the toner image after developing but before electrostatic transfer is 0.25 or less.

2. An image forming apparatus, comprising:

a latent image support for supporting a latent image;

developing means for using toner to develop the latent image on said latent image support;

transfer means for electrostatically transferring the toner image on said latent image support onto a recording medium; and

fixing means for bringing a heating member into close contact with the toner image electrostatically transferred onto said recording medium and thereby fixing said toner image to said recording medium,

wherein the estimated average halftone granularity of the toner image after developing but before electrostatic transfer is 0.25 or less.

3. The image forming apparatus according to Claim 2, wherein a toner having a weight average particle size of 4.2 to 6.8 μm is specified as the toner used to form the toner image.

4. The image forming apparatus according to Claim 2, further comprising toner housing means for housing the toner used to develop the latent image on the latent image support, said toner housing means housing a toner with a weight average particle size of 4.2 to 6.8 μm .

5. The image forming apparatus according to Claim 2, wherein the average halftone granularity of

the toner image after electrostatic transfer but before fixing is 0.25 or less.

6. The image forming apparatus according to Claim 5, wherein a toner with a weight average particle size of 4.2 to 6.8 μm , an average circularity of at least 0.98, and a degree of dispersion of 1.10 or less is specified as the toner used to form the toner image, the transfer means passes a transfer current of 20 to 400 nA/mm^2 between the latent image support and a pressing member for pressing the recording medium toward the latent image support, and electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm^2 .

7. The image forming apparatus according to Claim 5, wherein the toner image after fixing has an average halftone granularity of 0.25 or less.

8. The image forming apparatus according to Claim 7, wherein a toner with a weight average particle size of 4.2 μm , an average circularity of at least 0.98, and a degree of dispersion of 1.10 or less

is specified as the toner used to form the toner image, the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image support, and electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm², and the fixing means comprises a pressing member of which surface is covered with silicone rubber.

9. An image forming method for forming a toner image on a recording medium, comprising the steps of:

supporting a latent image on a latent image support;

using toner to develop the latent image on said latent image support;

electrostatically transferring the toner image on said latent image support onto a recording medium; and

bringing a heating member into close contact with the toner image electrostatically transferred onto said recording medium and thereby fixing said toner image to said recording medium,

wherein the toner used to form the toner image is manufactured by polymerization, and the estimated average halftone granularity of the toner image after developing but before electrostatic transfer is 0.25 or less.

10. An image forming apparatus, comprising:
a latent image support for supporting a latent image;

developing means for using toner to develop the latent image on said latent image support;

transfer means for electrostatically transferring the toner image on said latent image support onto a recording medium; and

fixing means for bringing a heating member into close contact with the toner image electrostatically transferred onto said recording medium and thereby fixing said toner image to said recording medium,

wherein the toner manufactured by polymerization is specified as the toner used to form the toner image, and the estimated average halftone granularity of the toner image after developing but before electrostatic transfer is 0.25 or less.

11. The image forming apparatus according to Claim 10, wherein a toner having a shape factor SF-1 of 140 or less, an average circularity of at least 0.92, and a degree of dispersion of 1.39 or less is specified as the toner.

12. The image forming apparatus according to Claim 10, wherein the toner image after electrostatic transfer but before fixing has an average halftone granularity of 0.25 or less.

13. The image forming apparatus according to Claim 12, wherein a toner having a shape factor SF-1 of 130 or less, an average circularity of at least 0.92, and a degree of dispersion of 1.37 or less is specified as the toner, and the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image support, and electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm².

14. The image forming apparatus according to Claim 12, wherein the average halftone granularity of the toner image after fixing is 0.25 or less.

15. The image forming apparatus according to Claim 14, wherein a toner having a shape factor SF-1 of 125 or less, an average circularity of at least 0.96, and a degree of dispersion of 1.35 or less is specified as the toner, the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image support, and electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm², and the fixing means comprises a pressing member of which surface is covered with silicone rubber.

16. The image forming apparatus according to Claim 14, wherein a toner having a shape factor SF-1 of 120 or less, an average circularity of at least 0.97, and a degree of dispersion of 1.21 or less is specified as the toner, the transfer means passes a

transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image support, and electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm², and the fixing means comprises a pressing member of which surface is covered with silicone rubber.

17. The image forming apparatus according to Claim 14, wherein a toner having a shape factor SF-1 of 115 or less, an average circularity of at least 0.97, and a degree of dispersion of 1.20 or less is specified as the toner, the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image support, and electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm², and the fixing means comprises a pressing member of which surface is covered with silicone

rubber or covered with a surface layer composed of a polytetrafluoroethylene resin on an elastic layer.

18. An image forming apparatus, comprising:
a latent image support for supporting a latent image;

developing means for using toner to develop the latent image on said latent image support;

transfer means for electrostatically transferring the toner image on said latent image support onto a recording medium;

fixing means for bringing a heating member into close contact with the toner image electrostatically transferred onto said recording medium and thereby fixing said toner image to said recording medium; and

toner housing means for housing the toner used to develop the latent image on the latent image support,

said toner housing means housing a toner manufactured by polymerization, and the estimated average halftone granularity of the toner image after developing but before electrostatic transfer being 0.25 or less.

19. The image forming apparatus according to Claim 18, wherein a toner having a shape factor SF-1

of 140 or less, an average circularity of at least 0.92, and a degree of dispersion of 1.39 or less is specified as the toner, or [the toner] is housed in the toner housing means.

20. The image forming apparatus according to Claim 18, wherein the average halftone granularity of the toner image after electrostatic transfer but before fixing is 0.25 or less.

21. The image forming apparatus according to Claim 20, wherein a toner having a shape factor SF-1 of 130 or less, an average circularity of at least 0.92, and a degree of dispersion of 1.37 or less is specified as the toner, or the toner is housed in the toner housing means, the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image support, and electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm².

22. The image forming apparatus according to Claim 20, wherein the average halftone granularity of the toner image after fixing is 0.25 or less.

23. The image forming apparatus according to Claim 22, wherein a toner having a shape factor SF-1 of 125 or less, an average circularity of at least 0.96, and a degree of dispersion of 1.35 or less is specified as the toner, or the toner is housed in the toner housing means, the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image support, electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm², and the fixing means comprises a pressing member of which surface is covered with silicone rubber.

24. The image forming apparatus according to Claim 22, wherein a toner having a shape factor SF-1 of 120 or less, an average circularity of at least 0.97, and a degree of dispersion of 1.21 or less is

specified as the toner, or the toner is housed in the toner housing means, the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image support, electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm², and the fixing means comprises a pressing member of which surface is covered with silicone rubber.

25. The image forming apparatus according to Claim 22, wherein a toner having a shape factor SF-1 of 115 or less, an average circularity of at least 0.97, and a degree of dispersion of 1.20 or less is specified as the toner, or the toner is housed in the toner housing means, the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image support, electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward

said latent image support at a pressure of 0.20 to 1.00 N/mm², and the fixing means comprises a pressing member of which surface is covered with silicone rubber or covered with a surface layer composed of a polytetrafluoroethylene resin on an elastic layer.

26. An image forming method for forming a toner image on a recording medium, comprising the steps of:
supporting a latent image on a latent image support;

using toner to develop the latent image on said latent image support;

electrostatically transferring the toner image on said latent image support onto a recording medium; and

bringing a heating member into close contact with the toner image electrostatically transferred onto said recording medium and thereby fixing said toner image to said recording medium,

wherein the estimated average halftone granularity of the toner image after developing but before electrostatic transfer is 0.15 or less, and the average halftone granularity of the toner image after fixing is 0.25 or less.

27. An image forming apparatus, comprising:

a latent image support for supporting a latent image;

developing means for using toner to develop the latent image on said latent image support;

transfer means for electrostatically transferring the toner image on said latent image support onto a recording medium; and

fixing means for bringing a heating member into close contact with the toner image electrostatically transferred onto said recording medium and thereby fixing said toner image to said recording medium,

wherein the estimated average halftone granularity of the toner image after developing but before electrostatic transfer is 0.15 or less, and the average halftone granularity of the toner image after fixing is 0.25 or less.

28. The image forming apparatus according to Claim 27, wherein a toner having a shape factor SF-1 of 125 or less, an average circularity of at least 0.96, and a degree of dispersion of 1.35 or less is specified as the toner, the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image

support, electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm², and the fixing means comprises a pressing member of which surface is covered with silicone rubber.

29. The image forming apparatus according to Claim 27, further comprising toner housing means for housing the toner used to develop the latent image on the latent image support, said toner housing means housing a toner with a shape factor SF-1 of 125 or less, an average circularity of at least 0.96, and a degree of dispersion of 1.35 or less, and wherein the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image support, electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm², and the fixing means comprises a pressing member of which surface is covered with silicone rubber.

30. The image forming apparatus according to Claim 27, wherein a toner having a shape factor SF-1 of 120 or less, an average circularity of at least 0.97, and a degree of dispersion of 1.21 or less is specified as the toner, the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image support, electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm², and the fixing means comprises a pressing member of which surface is covered with silicone rubber.

31. The image forming apparatus according to Claim 27, wherein a toner having a shape factor SF-1 of 115 or less, an average circularity of at least 0.97, and a degree of dispersion of 1.20 or less is specified as the toner, the transfer means passes a transfer current of 20 to 200 nA/mm² between the latent image support and a pressing member for pressing the recording medium toward the latent image

support, electrostatically transfers the toner image on said latent image support onto said recording medium while pressing said recording medium toward said latent image support at a pressure of 0.20 to 1.00 N/mm², and the fixing means comprises a pressing member of which surface is covered with silicone rubber or covered with a surface layer composed of a polytetrafluoroethylene resin on an elastic layer.